

## REMARKS

Applicant wishes to thank Examiner Yu for the time and courtesy extended during telephonic interview held on 14 March 2011 with Attorney Eugene Hirschkoff, counsel for Applicant.

Claims 20-54 are pending in this application. Claims 20, 22, 38, 40, 42, 46, 49, and 52 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Perahia et al. (US 7,352,688 B1) in view of Erceg et al. (US 2003/0050020 A1). Applicant has amended independent claims 20 and 42 and these claims were discussed during the interview on 14 March 2011. Support for these amendments is found in Fig. 2 and in paragraphs [0031], [0032], and [0033] of the Applicant's published patent application. No agreement was reached, but Mr. Yu did acknowledge that the current prior art did not appear to suggest or show the limitations now included in claims 20 and 42.

With respect to independent claims 20 and 42, the Examiner observes that Perahia discloses a method for operating MIMO air interfaces in mobile communication systems wherein the method comprises, amongst other elements, assigning different polarizations to the signals that are to be transmitted and received on the sub-channels, and refers to FIG. 3 and col. 5, lines 6-15, where Perahia describes mapping a first and second sub-channel to horizontal and vertical antenna polarizations, respectively. However, there is no teaching in Perahia of splitting the radio signal of each sub channel into two partial signals of predetermined ratio (as shown in Fig. 2 of the current application), assigning a different polarization to each partial signal by means of passing each partial signal through a delay line, and then superimposing the partial signals with polarizations so assigned and conveying the superimposed signals to a single antenna array. Moreover, there is no disclosure or teaching in Erceg or any of the other references previously cited by the Examiner which would suggest this novel feature of amended claims 20 and 42 to one of ordinary skill in the art at the time of the invention.

In view of the foregoing argument and these amendments to claims 20 and

42, Applicant respectfully requests that the Examiner reconsider and move these claims forward to allowance.

Since claims 21-41 depend from claim 20, and claims 42- 54 depend from claim 42, Applicant further requests that the rejection of these claims also be removed in view of the same arguments and amendments.

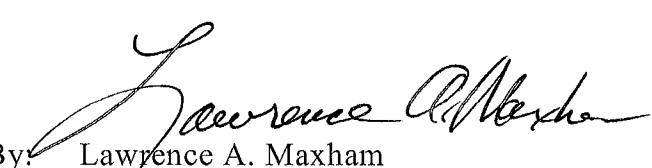
### **Conclusion**

In view of the foregoing discussion and the amendments to the claims, Applicant respectfully requests reconsideration and allowance of all claims 20-54, as amended. Should any issues remain unresolved, Examiner Yu is invited to contact the undersigned attorney.

Respectfully submitted,

Gerhard KRUSE

The Maxham Firm  
A Professional Corporation  
9330 Scranton Road, Suite 350  
San Diego, California 92121  
Telephone: (858) 587-7659  
Facsimile: (858) 587-7658

By:   
Lawrence A. Maxham  
Attorney for Applicant  
Registration No. 24,483